

## **AMENDMENTS TO THE CLAIMS**

This listing of claims will replace all prior versions, and listings, of claims in the application:

### **LISTING OF CLAIMS**

1. (Currently Amended) A wireless mobile phone comprising:  
a processor;  
a transceiver coupled to the processor, and configured to facilitate wireless telephony communication by a user;  
a reader coupled to the processor, and configured to read a reference heart beat profile of the user from an identity card of the user, wherein the identity card is external to, and not part of the wireless mobile phone;  
a plurality of sensors coupled to the processor, and configured to facilitate real time capturing of a heart beat profile of the user from the user's hand; and  
operating logic configured to be operated by the processor, to receive the real time captured heart beat profile of the user, to authenticate the user by comparing the real time captured heart beat profile with the reference heart beat profile, and to selectively operate the wireless mobile phone components depending on whether the user is successfully authenticated via a real time captured heart beat profile of the user based at least in part on a result of the comparison.
2. (Cancelled)
3. (Currently Amended) The wireless mobile phone of claim 1, wherein the operating logic is further configured to comprise logic to save the real time captured heart beat profile of the user as another reference heart beat profile for future authentication.
4. (Cancelled)

5. (Currently Amended) The wireless mobile phone of claim 41, wherein the reference heart beat profile is stored on said identity card in a manner to be read by a reader comprises selected from the reader group consisting of an electronic reader, an optical reader, and/or a magnetic reader, and the wireless mobile phone further comprises the selected reader.

6. (Currently amended) The wireless mobile phone of claim 1, wherein ~~the wireless mobile phone further comprises a reader to facilitate retrieval of the reference heart beat profile from a storage, the storage removably attached to the wireless mobile phone. the sensors are positioned along periphery of the wireless mobile phone.~~

7. (Currently Amended) In a wireless mobile phone, a method of operation comprising:  
~~reading a reference heart beat profile of a user, by a reader of the wireless mobile phone, from an identity card of the user, wherein the identity card is external to, and not part of the wireless mobile phone;~~

~~capturing in real time, from at the hand of the a user, by sensors of the wireless mobile phone, a heart beat profile of the user;~~

~~authenticating the user, by the phone, using including comparing the real time captured heart beat profile of the user with the reference heart beat profile; and~~

~~operating a processor and a transceiver of the wireless mobile phone to facilitate wireless telephony communication by the user, beyond a set of functions not requiring user authentication, if the user is successfully authenticated via the comparison real time captured heart beat profile of the user.~~

8. (Cancelled)

9. (Currently Amended) The method of claim 7, wherein the method further comprises saving the real time captured heart beat profile of the user as another reference heart beat profile for future authentication.

10. (Cancelled)
11. (Cancelled)
12. (Currently Amended) A wireless mobile phone comprising:  
a processor and a transceiver coupled to each other, and configured to facilitate wireless telephony communication by a user, with the processor being configured to operate in at least a selected one of a first mode and a second mode;  
a reader coupled with the processor, and configured to facilitate reading of a reference biometric profile of the user, from an identity card of the user, wherein the identity card is external, not part of the wireless mobile phone;  
one or more sensors coupled with the processor, and configured to capture in real time a biometric profile from the user; and  
operating logic configured to authenticate the user, by comparing the real time captured biometric profile with the reference biometric profile, to operate the processor in said first mode without authentication of the user, and to operate the processor in said second mode if the user is successfully authenticated based at least in part on a heartbeat profile captured from the user's hand.
13. (Currently Amended) The wireless mobile phone of claim 12, wherein the first mode has less functions available than the second mode ~~the operating logic enables the processor to provide first one or more functions, including a function to retrieve a heartbeat profile from a storage removably attached to the wireless mobile phone, while operating the components in said first mode, and further enables the processor to provide second additional one or more functions, while operating the components in said second mode.~~

14. (Currently Amended) The wireless mobile phone of claim 13, wherein ~~the heart beat of the user to be authenticated is captured from the user's hand by a~~ ~~the sensors are~~ positioned along the periphery of the wireless mobile phone.

15. (Currently Amended) In a wireless mobile phone, a method of operation comprising: operating a processor and a transceiver coupled to each other to facilitate wireless telephony communication by a user, in a first mode, prior to authenticating the user;

reading a reference biometric profile of the user, by a reader of the phone, from an identity card of the user, wherein the identity card is external to, and not part of the wireless mobile phone;

receiving capturing in real time a biometric heart beat input profile of the user ~~eaptured~~ from the user's hand, by ~~a~~ one or more ~~sensors~~, ~~the heart beat input for authenticating the user;~~

authenticating the user, by comparing the real time captured biometric profile with the reference biometric profile; and

operating the components in a second mode if the user is successfully authenticated based at least in part on the heart beat of the user ~~a result of said comparing.~~

16. (Currently Amended) The method of claim 15, wherein the first mode has less functions available than the second mode ~~said operating of the processor in said first mode comprises enabling the processor to provide first one or more functions, including retrieving a heart beat profile from a storage device removably attached to the wireless mobile phone, and said operating of the plurality of components in said second mode comprises enabling the components to further provide second one or more functions.~~

17. (Currently Amended) The method of claim 15, wherein the heart beat input of the user to be authenticated is captured automatically by the sensor upon power-up ~~said capturing comprises capturing in real time a biometric profile of the user, by the one or more sensors, upon power-up of the wireless mobile phone.~~